

ORIGINAL

DOCKET FILE COPY ORIGINAL

**Before the
FEDERAL COMMUNICATIONS COMMISSION
Washington, D.C. 20554**

RECEIVED
JUL 20 1999
FEDERAL COMMUNICATIONS COMMISSION
OFFICE OF THE SECRETARY

In the Matter of)	
)	
Petition by the United States Department)	CC Docket No. 92-105
of Transportation for Assignment of an)	NSD-L-99-24
Abbreviated Dialing Code (N11) to Access)	
Intelligent Transportation System (ITS))	
Services Nationwide)	

**JOINT COMMENTS OF
THE INTELLIGENT TRANSPORTATION SOCIETY OF AMERICA,
THE AMERICAN PUBLIC TRANSIT ASSOCIATION, AND
THE ASSOCIATION OF STATE HIGHWAY AND
TRANSPORTATION OFFICIALS**

American Public Transit Association
1201 New York Ave., N.W.
Suite 400
Washington, D.C. 20005
(202) 898-4000

Association of State Highway
and Transportation Officials
444 North Capitol Street, N.W.
Suite 249
Washington, D.C. 20001
(202) 624-5800

July 20, 1999

John J. Collins
CEO & President
Intelligent Transportation Society
of America
400 Virginia Ave., S.W.
Suite 800
Washington, D.C. 20024-2730
(202) 484-4847

No. of Copies rec'd
List ABCDE

0+9

EXECUTIVE SUMMARY

The Intelligent Transportation Society of America (“ITS America”), the American Public Transit Association (“APTA”), and the American Association of State Highway and Transportation Officials (“AASHTO”) (collectively “Joint Commenters”) strongly support the U.S. Department of Transportation’s (“U.S. DOT”) Petition for the assignment of an N11 number to access traffic, transit, and traveler information.

The Joint Commenters believe that grant of an N11 assignment would be consistent with Commission precedent and is justified. An N11 assignment for traffic, transit, and traveler information is consistent with the Commission’s previous decision to assign 311 for non-emergency police use and 711 for access to Telecommunications Relay Services. Further, an N11 assignment is clearly in the public interest. Such an assignment is in accord with the Commission’s continuing effort to promote the use of communications technology for public safety and transportation efficiency, and to facilitate the development and implementation of the nation’s Intelligent Transportation System (“ITS”). The assignment of a national uniform N11 number serves the public interest because end users would know that they can dial this number from virtually any exchange, and from virtually any street or highway, in the country in order to obtain travel-related information.

The benefits of traffic, transit, and traveler information can be realized, however, only by the assignment of a nationwide N11 number. The Joint Commenters have assembled evidence (in Appendix 7) that clearly illustrates the need for a national number that is easy to recall and

universally understood, and reflects the ongoing efforts of various institutions and industry to deploy Advanced Traveler Information Services (“ATIS”). At present, whether commuting within a city or traveling across interstate regions, people must learn an increasing proliferation of different telephone numbers to gain access to valuable information. The Joint Commenters concur with U.S. DOT that a single, nationwide N11 number is essential to promoting greater use of traveler information systems and achieving the benefits associated with use of such information.

A uniform N11 number would serve to reduce confusion and frustration over the plethora of numbers in different cities and states. As the Commission has previously recognized, dialing schemes of different lengths can lead to customer confusion. Important traffic and transit information, while currently available in all states, is underutilized because of the myriad numbers that people must employ to obtain needed information and because some systems are available only on a limited basis (*e.g.*, to wireless subscribers). The benefits of improving the timeliness of quality of traveler information generally available are compelling, and include improved roadway safety, enhanced mobility, lessened congestion, and improved environmental conditions. These are all important goals of the ITS program as established by Congress in the Intermodal Surface Transportation Efficiency Act of 1991 (“ISTEA”) and confirmed in the Transportation Equity Act for the 21st Century (“TEA21”), which was signed into law in 1998.

N11 is the most effective means of disseminating travel-related information. N11 provides an option that is easier to remember, easier to dial, and faster and quicker than seven or ten-digit alternatives. Other alternatives for establishing a national number such as a three-digit

number like 222, XX#. *XX, a 555 prefix, a seven-digit number, an 800 or 900 number are not effective options for interoperable access to ITS user services. These alternative dialing formats present barriers to implementation and interoperability because of cost, public perception, technical feasibility, and code availability.

If the Commission assigns an N11 for traffic, transit, and traveler information, there can be little doubt that it will be implemented by states and local governments and that the easy to remember number will be used by the public to access valuable information. N11's virtual ubiquity and eventual nationwide status as the phone number to use for quick and easy access to travel-related information supports granting an N11 assignment. Traffic, transit, and traveler information will be available in all areas (metropolitan cities and rural areas) and to all potential end users – including those of varying economic levels and those with physical disabilities – whether by wireline or wireless phones. The availability of travel-related information will truly be universal. For the foregoing reasons, and those presented in the comments that follow, ITS America, APTA, and AASHTO urge the Commission to grant U.S. DOT's Petition.

TABLE OF CONTENTS

	PAGE
EXECUTIVE SUMMARY	ii
 I. INTRODUCTION	 2
A. ITS America.....	3
B. APTA	9
C. AASHTO	11
D. The Commission Has Made a Continuing Commitment to Promote the Use of Communications Technology to Preserve Public Safety and Facilitate the Development and Implementation of the Nation’s Intelligent Transportation Systems.....	 12
(1) DSRC Spectrum Allocation (ET Docket No. 98-95).....	13
(2) Wireless Enhanced 911 (CC Docket No. 94-102).....	15
(3) The ITS Radio Service and LMS Spectrum Allocation (PR Docket No. 93-61)	 16
(4) Other ITS-Related Dockets.....	17
 II. ASSIGNMENT OF AN N11 FOR TRAFFIC, TRANSIT, AND TRAVELER INFORMATION WILL SERVE A CRITICAL PUBLIC NEED.....	 19
A. Survey of Traveler Information Services.....	19
B. There Exists the Public Need for Traffic, Transit, and Traveler Information	21
C. N11 Will Provide Ubiquitous Access to Critical Traffic, Transit and Traveler Information	 26
 III. NO DELIVERY MECHANISM OTHER THAN N11 CAN SATISFY THE PUBLIC NEED FOR TRAFFIC, TRANSIT, AND TRAVELER INFORMATION	 29
A. N11 is the Most Effective Means for Disseminating Traffic, Transit, and Traveler Information.....	 30
B. Other Delivery Mechanisms for Traffic, Transit, and Traveler Information Are Not as Effective as N11	 32
 IV. AN INFRASTRUCTURE ALREADY EXISTS FOR IMPLEMENTATION OF N11 FOR TRAFFIC, TRANSIT, AND TRAVELER INFORMATION.....	 35

A.	State and Local Public Officials will be Responsible for Implementing an N11 Assignment for Traffic, Transit and Traveler Information	36
B.	Funding Exists for N11 Implementation.....	38
C.	N11 for Traveler Information Services can be a Key to Unlocking Enhanced 911 Deployment.....	40
V.	THE GRANT OF AN N11 ASSIGNMENT FOR TRAFFIC, TRANSIT, AND TRAVEL INFORMATION WOULD BE CONSISTENT WITH EXISTING COMMISSION PRECEDENT AND IS JUSTIFIED	42
A.	An N11 Assignment for ATIS Information Is Consistent With the Commission's Decision to Assign 311 and 711	43
(1)	Assignment of 311 for non-emergency police.....	44
(2)	Assignment of 711 for TRS	47
B.	An N11 Assignment for Traveler Information Serves to Promote the Commission's Objective of Public Safety and Universal Availability of Communications Services.....	49
VI.	CONCLUSION.....	51
APPENDIX 1:	ITS America Membership List (as of June 23, 1999).	
APPENDIX 2:	Excerpt from "IVHS Strategic Plan of Intelligent Vehicle-Highway Systems" (1992).	
APPENDIX 3:	Excerpt from "National ITS Program Plan," Vol. II (1995).	
APPENDIX 4:	Excerpt from "Choosing the Route to Traveler Information Systems Deployment: Decision Factors for Creating Public/Private Business Plans" (1998).	
APPENDIX 5:	American Public Transit Association Membership List (as of July 16, 1999); and American Public Transit Association Resolution of Nationwide Traveler Information Telephone Number.	
APPENDIX 6:	Association of State Highway and Transportation Officials, "Supporting Reservation of an N11 Code for Transportation and Traveler Information Purposes," Policy Resolution PR-15-98 (approved Nov. 8, 1998).	

APPENDIX 7: Survey: List of Current Traffic, Transit, and Traveler Information Services Available by Telephone (July 16, 1999).

**Before the
FEDERAL COMMUNICATIONS COMMISSION
Washington, D.C. 20554**

In the Matter of)	
)	
Petition by the United States Department)	CC Docket No. 92-105
of Transportation for Assignment of an)	NSD-L-99-24
Abbreviated Dialing Code (N11) to Access)	
Intelligent Transportation System (ITS))	
Services Nationwide)	

**JOINT COMMENTS OF
THE INTELLIGENT TRANSPORTATION SOCIETY OF AMERICA,
THE AMERICAN PUBLIC TRANSIT ASSOCIATION, AND
THE ASSOCIATION OF STATE HIGHWAY AND
TRANSPORTATION OFFICIALS**

The Intelligent Transportation Society of America ("ITS America"), the American Public Transit Association ("APTA"), and the American Association of State Highway and Transportation Officials ("AASHTO") (collectively the "Joint Commenters")¹, pursuant to Section 1.401 of the Commission's Rules,² hereby respectfully submit their comments in

¹ The views expressed in the Joint Comments of ITS America, APTA, and AASHTO do not necessarily reflect the views of each of the individual members of these organizations.

² 47 C.F.R. § 1.401.

response to the Public Notice³ issued by the Commission concerning the above-referenced Petition for Rulemaking filed by the United States Department of Transportation (“U.S. DOT”).⁴ The Joint Commenters fully support U.S. DOT’s Petition for the assignment of an abbreviated dialing code (“N11”)⁵ to access Intelligent Transportation Systems (“ITS”) offering traffic, transit and traveler information.

I. INTRODUCTION

ITS America, APTA, and AASHTO are three of the national transportation organizations most active in the development and deployment of ITS services throughout the United States. The three organizations concur that there is a compelling public interest that can best be served by the assignment of an N11 for traffic, transit, and traveler information. Therefore, ITS America, APTA, and AASHTO request that the Commission grant the U.S. Department of Transportation’s Petition.

³ Public Notice, *Petition by the United States Department of Transportation for Assignment of an Abbreviated Dialing Code (N11) to Access Intelligent Transportation System (ITS) Services Nationwide*, DA 99-761 (rel. April 20, 1999).

⁴ See Petition by the United States Department of Transportation for Assignment of an Abbreviated Dialing Code (N11) to Access Intelligent Transportation System (ITS) Services Nationwide (filed March 8, 1999) (“U.S. DOT Petition”).

⁵ “Among abbreviated dialing arrangements” are telephone numbers of less than the standard 7 or 10 digits. Among abbreviated dialing arrangements, “N11 codes” are 3-digit telephone numbers of which the first digit may be any digit other than 0 or 1, and the last two digits are both 1. *In the Matter of The Use of N11 Codes and Other Abbreviated Dialing Arrangements*, CC Docket No. 92-105, First Report and Order and Further Notice of Proposed Rulemaking, 12 FCC Rcd 5572, 5574 (1997) (“*N11 First Report and Order*”).

A. ITS America

ITS America is a nonprofit, educational, and scientific association dedicated to the development and deployment of ITS to improve the safety and efficiency of the nation's surface transportation infrastructure.⁶ In this capacity, ITS America serves as a utilized Federal Advisory Committee to the U.S. Department of Transportation under the Federal Advisory Committee Act.⁷ In addition, ITS America coordinates and represents its members in ITS matters, including participating in proceedings and rulemakings before the FCC to help realize the implementation of policies to facilitate the deployment of ITS applications throughout the United States, consistent with the Transportation Equity Act for the 21st Century. ("TEA-21").⁸

Since its inception in 1991, ITS America has provided a leadership role in the public/private partnerships to deploy ITS. The organization's members are drawn from all facets of business, the academic community and government that have a stake in the application of technology to improving transportation. Currently, ITS America has 1025 organizational

⁶ ITS uses communications, computer and information technology in transportation to save lives, time, and money. ITS technologies include electronic toll facilities where a toll can be paid electronically by a vehicle traveling at highway speeds; computerized control of traffic signals where traffic flow can be speeded up or slowed down as conditions warrant; "real time" information provided to travelers on traffic, weather and other conditions; in-vehicle navigation and route guidance systems; and collision warning devices and "mayday" systems that can pinpoint the location of broken-down vehicles and notify the appropriate authorities.

⁷ 5 U.S.C. Appendix.

⁸ Transportation Equity Act for the 21st Century, Pub. L. No. 105-178, 112 Stat. 107 (1998) ("TEA-21") (see especially Title V, Subtitle C).

members: 57% from private companies, 27% from all levels of government, 8% from academia, and the remaining 8% from other associations. Collectively, these members are representative of the entire surface transportation industry in the United States and are a significant percentage of the worldwide surface transportation industry. A current list of all ITS America's members is in Appendix 1 of this Comment.

ITS America has worked closely with the U.S. DOT, its members, and others to identify and develop the goals, objectives, and milestones for ITS development and deployment for the next 20 years. These efforts have produced, among other things, a National ITS Strategic Plan, a National ITS Program Plan, and a multi-volume National ITS Architecture.

ITS America, itself, is a true public/private partnership. The 49-member Board of Directors is balanced between executives of public and private sector organizations. Technical activities are coordinated and advanced by the 54-member Coordinating Council that oversees 23 technical committees and task forces. Within the technical committee structure of ITS America, there are two committees with members who would play -- and are playing -- important roles in the deployment of N11 services for traffic, transit and traveler information if the Commission were to make the assignment. ITS America's Advanced Traveler Information Services Committee is comprised of approximately 400 members representing many state and local transportation authorities, as well as private companies, many of whom are already in the business of providing real-time traveler information to the public. Moreover, ITS America's Telecommunications Committee, with some 280 members, includes officials overseeing the

deployment and operations of the communications infrastructure that makes ITS, and specific applications such as traveler information services, possible.

In 1992, ITS America, the U.S. DOT, and other stakeholders drafted a Strategic Plan for ITS development and deployment, then generally known as “Intelligent Vehicle-Highway Systems” (“IVHS”). Included in this document is a first description of the Advanced Traveler Information Services (“ATIS”) concept that considered research and development activities, operational testing, and deployment efforts. The relevant section from the 1992 IVHS Strategic Plan is in Appendix 2 of this Comment. In 1995, ITS America and U.S. DOT concluded the drafting of a National ITS Program Plan that further defined the future development and deployment of ITS applications in the United States. Included in this document is the first articulation of twenty-nine “user services” that explain the specific ITS applications encompassed by the national ITS program. Five of these user services, bundled under the general headings of Travel and Transportation Management, Travel Demand Management and Public Transportation Operations, provide specific examples of the ATIS concept. They are: En-Route Driver Information, Route Guidance, Traveler Services Information, Pre-Trip Travel Information and En-Route Transit Information. A copy of the relevant pages from the 1995 National ITS Program Plan appear in Appendix 3 of this Comment. Currently, the U.S. DOT is in the process of updating the National ITS Program Plan as required under TEA-21,⁹ which will include a further evolution of the ATIS user service. In 1998, ITS America’s membership, with support from the U.S. DOT, developed an advisory report detailing business models on how

public and private organizations can partner to identify, collect, package, and disseminate traffic, transit, and traveler information to the public. The introduction from this report, called “Choosing the Route to Traveler Information Systems Deployment: Decision Factors for Creating Public/Private Business Plans,” is attached to this Comment as Appendix 4.

Concurrent with the drafting of the 1992 Strategic Plan for IVHS and the 1995 National ITS Program Plan, ITS America and U.S. DOT undertook an effort to develop a National ITS Architecture for ITS. To realize the full potential of ITS, a unified framework for interoperability and integration, called a “systems architecture,” was needed to guide a coordinated deployment of ITS by public agencies and private organizations. This National ITS Architecture is, in effect, a blueprint that defines the functions performed by ITS components and the various ways in which components can be interconnected. It is a tool for designers, planners, builders, and operators of ITS applications to coordinate their efforts in order to achieve integration of these systems within a given city, region, and state or even nationally. The National ITS Architecture breaks down the now more than 30 user services into their component parts, including for ATIS, thus defining the physical infrastructure and communications links between and among vehicles, the roadside, and operations centers. It is believed that following the National ITS Architecture will ensure that ITS applications actually deployed will be integrated and interoperable.

⁹ See *id.* at § 5205.

The national ITS program was initiated under the Intermodal Surface Transportation Efficiency Act ("ISTEA") of 1991.¹⁰ With the passage of TEA-21 in June 1998, the U.S. Congress declared that the national ITS program would move from one of technology development and testing to one of national deployment, focusing on achieving the goal of national interoperability and integration of ITS systems and applications. This legislation established a program to develop and test ITS technologies.¹¹ In TEA-21, Congress made the determination that the federal investments made under ISTEA in ITS research and testing "can mitigate surface transportation in a cost-effective manner,"¹² and that "continued investment in architecture and standards development, research, systems integration is needed" to develop ITS applications and incorporate them into the nation's transportation networks.¹³ In addition, Congress articulated the following goals for the national ITS program:

- (1) improvement of surface transportation efficiency to meet future transportation needs, including freight movement and reducing overall transportation costs;
- (2) surface transportation safety improvements with emphasis on reducing the number and severity of collisions;
- (3) protection and improvement of the environment and communities affected by surface transportation systems;
- (4) meeting the needs of all users of surface transportation systems, including commercial vehicles, passengers cars, motorcycles and persons with disabilities; and
- (5) improvement in the ability to respond to emergencies and natural disasters.¹⁴

¹⁰ Pub. L. No. 102-240, 105 Stat. 1916 (1991) ("ISTEA").

¹¹ *Id.* at Title V, Part B (the "Intelligent Vehicle-Highway Systems Act of 1991").

¹² TEA-21, at § 5202(1).

¹³ *Id.* at § 5202(2).

¹⁴ *Id.* at § 5203.

Based on these findings and goals, Congress reauthorized a federal ITS program with two components: (1) continued funding for research, standards, and architecture development; and (2) “seed money” to be provided to states, cities, and counties as incentives to spur deployment efforts. These two activities within the national ITS program are designed to work together in order to achieve national interoperability and integration for ITS. Congress instructed that the “national architecture shall promote interoperability . . . of intelligent transportation technologies implemented throughout the United States.”¹⁵ Likewise, Congress mandated that the U.S. DOT “shall conduct a comprehensive program to accelerate the integration and interoperability of intelligent transportation systems in metropolitan and rural areas” as part of national deployment efforts.¹⁶ Additionally, Congress went a step further to ensure that national integration and interoperability would be achieved, requiring that all ITS deployment projects – whether for traffic management, transit, electronic toll collection, etc. – receiving federal funding must utilize and “conform” to national ITS standards and architecture.¹⁷ Congress understood that the greatest benefits accruing from ITS can only be realized when ITS systems are interoperable and integrated across the nation.

Likewise, ITS America is shifting its priorities to support the national effort to deploy ITS. In its role as a national forum and information clearinghouse for the ITS community, ITS

¹⁵ *Id.* at § 5206(a)(2).

¹⁶ *Id.* at § 5208(a).

¹⁷ *Id.* at § 5206(e)(1).

America is devoting, and will continue to devote, its resources to achieving the goals of interoperability and integration. ITS America views the availability of an N11 for traveler information services as a critical step in this effort.

B. APTA

Celebrating its 25th anniversary as a modern entity that traces its roots to 1882, the American Public Transit Association (“APTA”) is a nonprofit trade association of over 1,200 member organizations including transit systems, product and service providers; planning, design, construction and financing firms; academic institutions; and state transit associations and departments of transportation. A current list of APTA’s members is attached to this Comment as Appendix 5. APTA and its diverse community of members work together to meet transit riders’ needs by assuring safe, high quality transit service through improved industry performance.

The establishment of a nationally-recognized communications tool linking the public with vital traveler information would significantly enhance the general population’s awareness of public transportation choices. Accordingly, by resolution, APTA’s Executive Committee has strongly endorsed the designation of a national telephone number for local traveler information systems to include public transportation. The resolution is attached as part of Appendix 5.

Public transportation provides a critical transportation choice and affords significant benefits in terms of congestion mitigation, pollution reduction, and meeting basic mobility needs. Some 29 million transit trips are provided around the country every weekday. Transit takes commuters to work; children to school; the elderly to public health services; and sports fans to

arenas and fields. In addition to its basic role in providing everyday transportation, transit can, and does, play a critical role in public safety. As an example, when the 1989 earthquake occurred in San Francisco while a World Series was taking place, one of the key bridges into the city was shut down, but the Bay Area Rapid Transit ("BART") system continued to run to serve the public. Also, when floods struck Sioux City, Iowa a few summers ago, local transit systems helped keep fundamental services running.

More than three hundred transit agencies currently operate traveler information systems using the telephone as the primary communications channel. In the more than 40 metropolitan areas where central numbers exist, these networks offer a wealth of information regarding schedule/route, and real-time information. But many travelers, especially people in unfamiliar areas, have difficulty remembering the numerous travel information telephone numbers available in different regions. APTA believes that use of these systems could be enhanced greatly through the availability of a uniform, easy-to-remember phone number.

Moreover, transit agencies that do not have a traveler information system in place at this time have indicated that the availability of a nationally-recognized number would greatly facilitate efforts to provide schedule/route, and other traveler information. Indeed, a recent survey of APTA member organizations reveals that a significant number of transit agencies without traveler information services would utilize a single, three-digit dialing code to provide the public with real-time traveler information if such a national number became available. Access to such information would enable travelers to make smarter decisions on when, where, and how to reach their destinations.

APTA believes that confidence in having instant access to information will make more people realize that transit is a viable transportation option, thereby improving mobility for all persons. An abbreviated dialing code for traveler information would represent a significant new portal to information about public transportation. APTA therefore supports the idea of a national three-digit number as part of a fully integrated traveler information system, including public transportation information.

C. AASHTO

The American Association of State Highway & Transportation Officials ("AASHTO") is the national association for departments of highways and transportation for the 50 states, the District of Columbia and Puerto Rico. The governing body of the association is its Board of Directors, which consists of the chief administrative officers of its 52 member departments. AASHTO's members are directly responsible for the construction, maintenance and operation of the nation's highways, airports, railways and other transportation infrastructure. AASHTO is responsible for establishing many of the standards and specifications for the construction and management of the nation's transportation systems.

AASHTO and its members recognized early the important role ITS services and systems play for coping with congestion, enhancing road safety, and alleviating environmental impacts imposed by transportation. Most transportation agencies and AASHTO members view ITS deployment as a key element in their long-range plans, extending through the first two or three decades of the millennium and beyond. AASHTO members recognize that the steady growth in transportation demands, both of persons and freight, will inevitably exceed reasonable estimates

of capacity increases, as limited by financial, environmental, and social factors. No one believes that we can "pave" our way to a demand/capacity balance. In AASHTO's view, ITS holds the promise of realizing greater benefits from the transportation systems already in place and in improving those systems to be developed in the future.

A key to the success of many of these ITS services is the ability of the public to learn about them, or about current transportation conditions, via telephone access. AASHTO and its members believe that the use of a nationwide, easily remembered N11 number for traveler information will help greatly in this communication. At its annual meeting last November, the AASHTO Board of Directors adopted Policy Resolution PR-15-98, entitled "Supporting Reservation of an N11 Dialing Code for Transportation and Traveler Information Purposes." This resolution, which is attached to this Comment as Appendix 6, advocates the establishment of a national N11 number for transportation information services.

D. The Commission Has Made a Continuing Commitment to Promote the Use of Communications Technology to Preserve Public Safety and Facilitate the Development and Implementation of the Nation's Intelligent Transportation Systems.

Over the past several years the Commission has played a significant role in promoting the safety and efficiency of the nation's surface transportation infrastructure through its commitment to, and support of, various ITS communications-related initiatives. ITS America, AASHTO, and APTA urge the Commission to continue that effort by assigning an N11 number for traffic, transit, and travel information. The Joint Commenters believe that an N11 number is a critical

component in the continuing development and implementation of the nation's intelligent transportation system and in meeting the Commission's public safety objectives.

An N11 assignment would play an integral role in people's lives. As Vice-President Gore stated in a public address in support of U.S. DOT's request for an N11 assignment, "[t]his enhanced commitment to easing traffic congestion and improving transportation information and options can make a real difference in people's everyday lives."¹⁸ Indeed, the Commission continues to make a difference in the way people live by exercising its jurisdiction in matters that relate to the development and deployment of ITS applications. The Commission has recognized that the development and deployment of ITS is consistent with its statutory obligation to promote safety of life and property and its public policy objective of encouraging the provision of new technologies and services to the public.

The following is a brief description of several recent, significant proceedings that illustrate the Commission's existing commitment to ITS development and deployment and that show how an N11 assignment would continue the Commission's commitment to the use of ITS for public safety and transportation efficiency.

(1). *DSRC Spectrum Allocation (ET Docket No. 98-95)*

In a highly significant contribution to the deployment of ITS services, the Commission, in response to a Petition for Rulemaking filed by ITS America, has proposed to allocate 75MHz

¹⁸ White House Press Release, "Vice President Gore Calls for a New Three-Digit Number to Ease Traffic Congestion, Improve Road Safety," at 1 (released March 8, 1999) (a copy of which can be viewed at Internet site <http://www.its.dot.gov/tcomm/whpress.htm>).

of radio spectrum for a variety of Dedicated Short Range Communications (“DSRC”) systems that are being designed to provide a short range, wireless link to transfer information between vehicles and the roadside.¹⁹ These systems, in turn, will be used in the deployment of ITS-related services to improve highway safety and efficiency. For example, DSRC-enabled services will include travelers’ alerts, automatic toll collection, traffic congestion detection, emergency dispatch services, and electronic inspection of moving trucks through data transmissions with roadside inspection facilities.

In that proceeding, the Commission has acknowledged that providing additional spectrum for ITS services will further the goals of Congress, the U.S. Department of Transportation, and the ITS industry to improve the efficiency of the U.S. transportation infrastructure and to facilitate the growth of the ITS industry.²⁰ In particular, the Commission has recognized that DSRC links will be essential to many ITS services that are expected to improve traveler safety, decrease traffic congestion, and facilitate the reduction of air pollution and conservation of fossil fuels.²¹ Adoption of an N11 assignment for traveler information would be entirely compatible and consistent with the proposed spectrum allocation and would help achieve these same laudable goals.

¹⁹ See *In the Matter of Amendment of Parts 2 and 90 of the Commission’s Rules to Allocate the 5.850-5.925 GHz Band to the Mobile Service for Dedicated Short Range Communications of Intelligent Transportation Services*, ET Docket No. 98-95, Notice of Proposed Rulemaking, 13 FCC Rcd 14321 (1998).

²⁰ *Id.* at 14321.

²¹ *Id.*

(2). *Wireless Enhanced 911 (CC Docket No. 94-102)*

In the Wireless Enhanced 911 proceeding, the Commission has stated its commitment to the rapid implementation of technologies needed to bring emergency help to wireless callers throughout the United States.²² The Commission has further indicated that the advanced features of Enhanced 911 (E-911) service, particularly automatic location information capability, a form of ITS technology, is expected to provide rapid and effective response by public safety agencies and personnel to emergency 911 calls.²³ The integration of automatic location information services with an N11 traffic and traveler information service will be an extremely powerful and effective combination in promoting highway safety. E-911-derived automatic location information will lead to improved traffic congestion information that, in turn, could automatically update an N11 service with real-time traffic information and enable alternate route planning. Furthermore, the availability of an N11 number with up-to-the-minute traffic information will provide public safety agencies and emergency vehicles responding to accidents with the ability to determine the best route to take to reach those in need of emergency assistance, thereby enhancing E-911 response times.

²² *In the Matter of Revision of the Commission's Rules to Ensure Compatibility with Enhanced 911 Emergency Calling Systems*, CC Docket No. 94-102, Report and Order and Further Notice of Proposed Rulemaking, 11 FCC Rcd 18676 (1996) ("*E911 First Report and Order*"), recon., 12 FCC Rcd 22665 (1997) ("*E911 Reconsideration Order*").

²³ *E911 First Report and Order*, 11 FCC Rcd at 18679.

(3). *The ITS Radio Service and LMS Spectrum Allocation (PR Docket No. 93-61)*

In 1995, the Commission adopted a Report and Order which, among other things, created a new subpart of Part 90, later renamed the ITS Radio Service.²⁴ The Commission stated that its creation of the ITS Radio Service “clearly demonstrates this agency’s commitment to the continued integration of radio-based technologies into the nation’s transportation infrastructure and our commitment to the development and implementation of the nation’s intelligent transportation systems of the future.”²⁵ The Commission further noted that the development of ITS will “improve the efficiency and safety of our nation’s highways, reduce harmful automobile emissions, promote more efficient energy use, and increase national productivity,” adding that “ITS systems will increase traffic mobility and efficiency by notifying motorists of traffic delays and recommending alternate routes, adjusting the settings of traffic signals to prevent anticipated traffic jams, and providing navigational assistance to direct a car to its destination according to the most efficient route.”²⁶

The *LMS Report and Order* also established rules governing the licensing of the 902-928 MHz frequency band for the Location and Monitoring Service (“LMS”), the first of the new ITS

²⁴ *In the Matter of Amendment of Part 90 of the Commission’s Rules to Adopt Regulations for Automatic Vehicle Monitoring Systems*, PR Docket No. 93-61, Report and Order, 10 FCC Rcd 4695 (“*LMS Report and Order*”), Second Report and Order, FCC 98-157 (rel. July 14, 1998) (“*LMS Second Report and Order*”).

²⁵ *LMS Report and Order*, 10 FCC Rcd at 4698.

²⁶ *Id.*

radio services. LMS encompasses both the Automatic Vehicle Monitoring systems and advanced transportation-related service systems. These services range from FCC-licensed vehicle location and automatic toll collection systems to unlicensed devices used for utility meter reading and inventory control. The systems have the potential, as the Commission noted, to accommodate a number of important functions, such as tracking and monitoring large fleets of vehicles and providing information to allow more efficient use of vehicles through better dispatch and routing information.²⁷

As an important delivery mechanism for notifying transportation users of traffic delays and disseminating information to be used for alternate route planning, an N11 assignment for traveler and traffic information will be an integral component of the ITS Radio Service as envisioned by the Commission. In particular, an N11 assignment would complement the Commission's stated goal of improving the efficiency and safety of our nation's highways through the promotion of ITS technologies and services.

(4) *Other ITS-Related Dockets*

In ET Docket No. 94-124, the Commission has engaged in an ongoing effort to open for commercial development portions of the spectrum known as the millimeter wave bands above 40 GHz.²⁸ The Commission recognized that these new bands and associated standards will permit

²⁷ *Id.* at 4696-97.

²⁸ *In the Matter of Amendment of Parts 2 and 15 of the Commission's Rules to Permit Use of Radio Frequencies Above 40 GHz for New Radio Applications*, ET Docket No. 94-124, First Report and Order, 11 FCC Rcd 4481 (1995), Second Report and Order, 12 FCC Rcd 10571 (1997).

the development of vehicle-based collision avoidance radar systems that could be used in conjunction with ITS, in addition to other potential uses.

In addition, in CC Docket 98-1, the Commission is considering a petition filed by the State of Minnesota for a declaratory ruling that the State's proposal to grant a wholesale provider of fiber optic transport capacity exclusive access to State freeway rights-of-way, subject to conditions designed to ensure competitive neutrality and non-discrimination, is consistent with Section 253 of the Communications Act, 47 U.S.C. § 253, as amended.²⁹ Because ITS systems are comprised of advanced communications and telecommunications infrastructure, and will involve the installation of many miles of fiber optic facilities along highways, the Commission's decision in this proceeding may have profound implications for the deployment of ITS to prepare the nation's surface transportation systems for the demands of the twenty-first century.

The proceedings described above reflect the important role that the Commission has played, and will continue to play, in the success of the deployment of ITS facilities and services. As part of the Commission's commitment to promoting the use of communications technology and services to enhance public safety and transportation efficiency in the nation's intelligent transportation system, an N11 assignment would significantly advance the development and deployment of that system. Moreover, an N11 assignment would serve as an important complement to the Commission's ongoing ITS-related initiatives.

²⁹ See Public Notice, "The State of Minnesota Petition for Declaratory Ruling Regarding the Relevance of Section 253 of the Telecommunications Act to an Agreement Governing Access to State Freeway Rights-of-Way," DA 98-32 (Jan. 9, 1998) (decision pending).

II. ASSIGNMENT OF AN N11 FOR TRAFFIC, TRANSIT, AND TRAVELER INFORMATION WILL SERVE A CRITICAL PUBLIC NEED.

The Joint Commenters have assembled herein empirical and anecdotal evidence that clearly illustrates the critical need for traveler information to be served by an N11 designation. This evidence shows that public transportation officials working with many others are already providing traffic, transit and general traveler information through a plethora of telephone numbers. Furthermore, large numbers of the public currently use these services. However, many of them are underutilized because many travelers are simply not aware of the correct number to dial in any given location. Consequently, there is a justifiable need for a national N11 number.

A. Survey of Traveler Information Services

The results of a survey conducted by ITS America, APTA, and AASHTO of traveler information services is attached to this Comment as Appendix 7. While it cannot be claimed that this list is inclusive of all such services, it does illustrate the enormous breadth and diversity of the services currently in operation. The parties identified 299 different phone numbers covering all 50 states. For each of these numbers, the list at Appendix 7 gives, where available, the number itself, managing entity, service or type of information, monthly call averages, geographic area and population served. The attached survey reflects, among other information, the following:

- Managing entities include: state departments of transportation; transit agencies; airports; state and local police; metropolitan planning organizations; town, city and

county governments; turnpike and bridge authorities; universities; private companies, including cellular providers; commuter railroads; ferry services; and, even, the United States Forest Service.

- Service or type of information available include: real-time traffic conditions and congestion; current and planned road and transit construction; transit (rail and bus) schedules and trip planning; ride-share and car pooling; airport parking and ground transportation; special event transportation; road closures; weather conditions, especially snow emergencies; and bridge conditions.
- Major urban areas include: Southern California (Los Angeles, Orange County, San Diego); San Francisco and Oakland; Phoenix (Maricopa County); Denver; Washington, D.C.; Miami, Atlanta; Chicago; Cincinnati; Boston; Detroit; Minneapolis/St. Paul; the New York/New Jersey/Connecticut region; Baltimore; New Orleans; Cleveland; Philadelphia; Houston; Dallas/Ft. Worth; Seattle; and Milwaukee.
- Predominantly rural states and areas include: Alaska (organized by highway mile posts); North and South Dakota; Wyoming; Maine; Idaho; Montana; New Mexico; Oklahoma; Iowa; Nebraska; Kansas; and Yosemite National Park.
- 144 identified transit agencies with one or more traveler information services.
- Transit Information Monthly Call Volumes: New Jersey, 375,000; District of Columbia, 250,000; Philadelphia, 250,000; Houston, 250,000; Minneapolis/St. Paul,

250,000; Chicago, 235,000; Dallas/Ft. Worth, 165,000; Denver, 160,000; Louisville, KY, 150,000; Milwaukee, and 115,000.

- Forty-two identified state departments of transportation with one or more traveler information services.
- Traffic and Road Information Monthly Call Volumes: Caltrans Highway Information Network (statewide), 300,000; Boston, 275,000; Wyoming (statewide), 90,000; Northern Kentucky/Cincinnati, 85,000; and San Francisco/Oakland, 62,000.

It bears repeating that all of the 299 services listed at Appendix 7 exist today, without the availability of a national N11 designation. Moreover, it appears that everyone in the United States can access one or more traveler information services in every place in the country.

However, despite the availability of travel-related information all over the United States, the service is underutilized because of the inconsistency in the phone numbers and the consequential inability of people to remember them and thereby access them. A single, uniform national N11 number is essential to increase access to traffic, transit, and traveler information in order to achieve the very public interest objectives (*e.g.*, promote traffic safety and facilitate mobility) that motivated the establishment of these numbers in the first instance.

B. There Exists the Public Need for Traffic, Transit, and Traveler Information.

Although it has been only a year since Congress declared that the U.S. DOT should undertake a program of national deployment, the benefits from ITS are already apparent. For example, it has been shown that synchronizing traffic lights can improve the flow of congested urban streets as well as reduce the number of accidents. Electronic toll collection along

highways and bridges not only reduces motorists' travel times and lowers the administrative cost of collecting tolls, but it also reduces pollution levels associated with cars and trucks waiting in line to pay those tolls manually. Trucks, buses, police, and emergency vehicles equipped with Automatic Vehicle Location devices make management of vehicle fleets easier and less costly, and also reduce response times for medical, police, and fire personnel.

If the public accesses real-time information, more people will avoid an incident on the road or rails, choose an alternative route or otherwise adjust their normal travel patterns. Consequently, resulting congestion would be less, and fewer people would be stuck in traffic. These benefits, while very real, are difficult to quantify.³⁰ Perhaps a real-life example can best illustrate the benefits of an N11 service.

On June 2nd of this year, a truck loaded with an explosive black powder overturned on a ramp of the Springfield Interchange connecting Interstate-395 and the Capitol Beltway, Interstate-495. Because of the extreme hazard posed by the accident, the Virginia State Police and the Virginia Department of Transportation ("VDOT") were forced to close major portions of the surrounding roadways in a three-mile radius. The traffic impact was significant in all directions.

³⁰ As an example of an effort to quantify the benefits of ATIS, a study in 1993 calculated that ATIS services in the Boston area have helped travelers switch from driving to use of public transit. According to this study, this adjustment of travel behavior nets an estimated 25% reduction of volatile organized compounds, a 1.5% reduction of oxides of nitrogen, and a 33% reduction of carbon monoxide. Tech Environment, Inc., "Air Quality Benefit of the SmarTraveler Advanced Traveler Information Service" (July 1993).

Within minutes of detecting the incident, the VDOT Smart Traffic Center in Arlington and Emergency Operations Center in Richmond distributed information about the incident to other public agencies within Virginia and throughout the north/south Interstate-95 corridor running along the east coast of the United States. Variable Message Signs ("VMS") along Interstate-95 -- 66 miles to the south and along Interstate-66 west to the Shenandoah Mountains -- advised motorists of the accident and suggested alternative routes. Moreover, motorists in Virginia were able to use their cellular phones to access VDOT's traveler information phone number of 1-800-367-ROAD or the Virginia State Police at #77 to receive current traffic conditions impacted by the accident.³¹

Many motorists also called SmartRoute Systems' SmarTraveler service in Washington, DC, which provides comprehensive real-time traffic and travel information in the District of Columbia, Maryland and Virginia by Internet, cable TV, and telephone at (202) 863-1313 or #211 from mobile phones for updates on the accident. SmartRoute Systems has reported to ITS America that over the 18 hours it took to clear the incident, the SmarTraveler office in the District of Columbia received almost as many calls as in a typical week, four times more than in

³¹ Presentation by David Gehr, Commissioner, Virginia Department of Transportation, at the National Press Club, Washington, D.C. on June 24, 1999. However, "XX#" or "*XX" numbers are not the most effective abbreviated dialing arrangements. See Section III.B of these Comments, *infra*.

a normal day. The calls averaged 1 every 20 seconds over the 18-hour period, with most during peak morning and evening rush hours.³²

There is little doubt that the “Black Powder” incident was a catastrophic event for traffic in the Washington, DC metropolitan area that day. However, traffic conditions would have been even worse if VDOT had not transmitted advisories to motorists through VMS signs and traffic information telephone numbers. The increase in call volume, as reported by SmartRoute Systems, illustrates that the public will use these telephone services, especially in response to a major incident, assuming, of course, that the public knows what number to call. An out-of-town motorist traveling through the area that day would not know what number to use to reach the SmarTraveler service, if indeed they knew it even existed. A national number means equal ease of access for all through familiar and unfamiliar roads.

Without an N11 number in place, there were limits on the existing numbers’ effectiveness. Variable Message Signs, located in only a few, select locations, can reach only those people who actually drive past them. Although SmartRoute Systems has made #211 available in the Washington, DC area, this number is limited to those drivers who have cellular phones and who have also contracted for cellular service with those wireless providers that have agreed to make #211 available on their networks. In contrast, an N11 service is ubiquitous

³² SmartRoute Systems report that call volume generally averages 650 to 750 a day in Washington, DC. In contrast, on June 2, 1999, 3201 calls were received in response to the Black Powder Incident. Other peak days of note: March 9, 1999, 4238 calls (snow storm); November 4, 1998, 2423 calls (attempted suicide over Wilson Bridge); January 8, 1999, 2325 calls (snowstorm).

across geographic areas and available to all callers regardless of income or types of phone: landline, wireless, pay and, even rotary.

The “Black Powder” incident is but one example of how the public is already accessing the traveler information services via telephone. Unfortunately, incidents such as this occur too often. On June 8, 1999, a pedestrian bridge over the Baltimore Beltway, Interstate-695, was struck by an oversized truck, causing it to collapse on to evening rush hour traffic.³³ As a result, the Baltimore Beltway had to be shut down for more than ten hours.³⁴ In this situation as well, accurate traffic information was critical for travelers in the Interstate-95 corridor who could have been alerted to alternative travel options, including transit.

N11 would be equally effective for purposes of informing the public of scheduled construction areas. For example, in the next several years, re-construction projects involving the Interstate-95/Interstate-395/Interstate-495 interchange (the “Mixing Bowl”) in Springfield, Virginia, and the Wilson Bridge over the Potomac River between Maryland and Virginia are scheduled to begin, resulting in new traffic patterns and increased congestion for several years.³⁵ Certainly, the availability of a national N11 number – which would be known by local commuters as well as infrequent travelers in those area – will help facilitate mobility.

³³ Washington Post, “Maryland Bridge Collapse Kills Driver; Truck Knocks Walkway Onto Baltimore Beltway,” June 9, 1999.

³⁴ *Id.*

³⁵ Washington Post, “Drivers Face A Long Road As Virginia Fixes Mixing Bowl,” January 3, 1999; Washington Post, “U.S. Offers Solutions for Wilson Bridge,” June 15, 1999.